

**REMARKS**

**A. Present Status of Patent Application**

Upon entry of the foregoing amendments, claims 1-7, 9-19, and newly added claim 21 remain pending and reconsideration of same is requested. Claims 8 and 20 are cancelled. Claim 21 is added. Claims 1-7, 9-10, and 17-19 are amended. These additions and amendments add no new subject matter to the present application.

Claims 8 and 20 are canceled without prejudice, waiver, or disclaimer. Applicant takes this action merely to reduce the number of disputed issues and to facilitate early allowance and issuance of other claims in the present application. Applicant reserves the right to pursue the subject matter of these canceled claims in a continuing application, if applicant so chooses, and does not intend to dedicate any of the canceled subject matter to the public.

The Office Action rejected claim 8 under 35 U.S.C. §112, first paragraph, as allegedly based on a disclosure which is not enabling. The Office Action also rejected claims 1, 4, 9, 10, 11, 13, and 17 under 35 U.S.C. §103(a) as being unpatentable over Boys (USPN 6,314,094). The Office Action rejected claims 2, 3, 5-8, 12, 16, 18, and 20 under 35 U.S.C. §103(a) as being unpatentable over Boys (USPN 6,314,094), in view of Lowe et al. (USPN 6,298,218). The Office Action rejected claims 14 and 15 under 35 U.S.C. §103(a) as being unpatentable over Boys (USPN 6,314,094), in view of Dao et al. (USPN 5,915,207). For at least the reasons set forth hereinafter, Applicant respectfully requests reconsideration and withdrawal of these rejections.

## **B. Summary of Present Invention**

This summary of invention section is intended to introduce the reader to aspects of the invention and is not a complete description of the invention. Particular aspects of the invention are pointed out in other sections hereinbelow, and the invention is set forth in the appended claims which alone demarcate its scope.

The invention provides a system and apparatus that enables communication of audio information to audiences using the Internet. The audience may be thinly scattered over a large area, such as the United States, or even worldwide, and thereby allows access to the audience that a single radio station would not be able to achieve without use of the invention. The invention enables dissemination of information to an audience that selects to receive the information thereby allowing access to a target market or potential target market that otherwise may not have been reached.

In accordance with the system of the invention, audio information, in the form of a digital communication, is received at a remote receiver via the Internet. The digital information may include any information that is typically broadcast by radio, such as music or other radio programming. The system converts the digital information to analog information, and broadcasts the analog information in a localized area in at least one preselected radio frequency. The broadcast analog information is received, and audio information is communicated to the listener. The receiver is preferably a common frequency modulated (FM) radio, capable of receiving the standard broadcast FM frequencies, tuned to preselected frequency broadcast in the localized area, but could equally well be an amplitude modulated

(AM) radio, or other type of radio. Thus, the user selects the audio communication (or digital information equivalent) it requires through the Internet, and the information is broadcast to the user's radio in a localized area (such as the user's home) where the user can hear the selected audio communication.

The invention also provides an Internet receiver/transmitter apparatus for receiving the digital information from the Internet, converting the information to analog form and transmitting to a radio receiver. The apparatus is preferably programmable for user preferences, for example, so that broadcasting may commence at a particular time at a particular frequency, and optionally cease at another time. Accordingly, the commencement of the broadcast may serve as an "alarm clock". In one embodiment, the apparatus is programmable through a PC with which it is in communication although programming may also be by other means, such as a keypad or internal software. Further, the apparatus is not limited to broadcasting only a single radio program, but may broadcast multiple programs, with each program broadcast at a unique preselected (i.e. preprogrammed) frequency. Thus, several listeners in the immediate environment, such as a home, may tune their respective radios to a preselected frequency to receive radio programming of their choice. The invention is clearly useful in hotels, dormitories, hostels, and the like where many persons having differing preferences in programming content reside in close quarters where low powered transmission may reach them. The apparatus further may be supplied with a memory for storing received transmissions for broadcast at a preset later time, or on demand.

The apparatus preferably but not necessarily includes a user readable display and a user interface for inputting control parameters, such as time to commence broadcast, frequency of broadcast, and other useful information. A PC has a suitable user interface for the functions, for example, although use of a PC is not necessary for the invention.

The invention provides, for the first time, a system and apparatus that communicates audio information worldwide through the Internet and permits users in a localized area around the transmitter of the apparatus to select the particular radio programming content they wish to listen to and when.

### **C. Discussion of Rejections**

#### **1. Independent Claims 1, 11 and 17**

The Office Action rejected claims 1, 11 and 17 under 35 U.S.C. §103(a) as being unpatentable over Boys (USPN 6,314,094). For the reasons set forth below, Applicant respectfully traverses this rejection.

It is well established at law that, for a proper rejection of a claim under 35 U.S.C. §103 as being obvious based upon a reference, the cited reference must disclose, teach, or suggest, either implicitly or explicitly, all elements/features/steps of the claim at issue. *See, e.g., In Re Dow Chemical, 5 U.S.P.Q.2d 1529, 1531 (Fed. Cir. 1988), and In re Keller, 208 U.S.P.Q.2d 871, 881 (C.C.P.A. 1981).*

a. Independent claim 1 as amended recites:

1. A method for receiving digital information and transmitting the information in a localized area, comprising the steps of:
  - receiving an audio communication as digital information from a remote source via the Internet;
  - converting the digital information to analog information;
  - broadcasting the analog information at low power in a localized area in at least one preselected radio frequency; and*
  - receiving the broadcast information in the localized area on a radio frequency receiver tuned to at least one frequency to permit listening to the audio communication.*

(Emphasis added.) Applicant respectfully submits that claim 1 patently defines over the cited prior art for at least the reason that the cited prior art fails to disclose or otherwise teach the features emphasized above.

The Office Action states “Boys teaches of a system for receiving digital information comprising of receiving an audio communication as digital information from a remote source via the Internet and converting the digital information ... in a localized area.” *Office Action* para. 8. In this respect, the reference and the claimed subject matter are similar. However, the reference cited differs from the claimed subject matter as is evident from the subsequent description. The *Boys* reference teaches broadcasting the information using a cellular system. In a cellular system, whether analog or digital, the user must register with the system and that user is allocated his own personal encoded channel to receive the broadcast information. The subject matter of claim 1, namely, the *broadcasting the analog information at low power in a localized area in at least one preselected radio frequency; and receiving the broadcast information in the localized area on a radio frequency receiver tuned to at least one*

*frequency to permit listening to the audio communication*, teaches broadcasting and receiving the information, as accessed from the Internet, on a radio frequency. This radio frequency is accessible by anyone with a radio tuner and is not limited to one particular user as the *Boys* system teaches. The claimed subject matter lowers system overhead and allows for free reception of the broadcast. This is a fundamental difference which the cited reference does not teach.

Additionally, the Applicants assert that it is not obvious to one skilled in the art at the time of the invention to use radio broadcasting to disseminate information from the Internet. “Virtually all [inventions] are combinations of old elements.” *Environmental Designs, Ltd. v. Union Oil Co.*, 713 F.2d 693, 698, 218 U.S.P.Q. (BNA) 865, 870 (Fed. Cir. 1983). “If identification of each claimed element in the prior art were sufficient to negate patentability, very few patents would ever issue.” *In re Rouffet*, 149 F.3d 1350, 47 U.S.P.Q.2D (BNA) 1453 (Fed. Cir. 1998). To prevent the use of hindsight based on the invention to defeat patentability of the invention, th[e] court[s] require the examiner to show a motivation to combine the references that create the case of obviousness. In other words, the examiner must show reasons that the skilled artisan, confronted with the same problems as the inventor and with no knowledge of the claimed invention, would select the elements from the cited prior art references for combination in the manner claimed. Id at 1357. Therefore, since the Office Action demonstrates no motivation to use open radio frequency broadcasting for the dissemination of information accessed from the Internet, the Applicants respectfully request that the rejection to claim 1 be withdrawn.

**b.** Independent claim 11 recites:

11. An apparatus for receiving information and broadcasting the information in a localized area, the apparatus comprising:

means for receiving digital information from a remote source via the Internet;

means for converting the digital information to analog information; and means for *broadcasting the analog information in a localized area in at least one preselected radio frequency*.

(Emphasis added.) Applicant respectfully submits that claim 11 patently defines over the cited prior art for at least the reason that the cited prior art fails to disclose or otherwise teach the features emphasized above.

The Office Action states “Boys teaches of a system for receiving digital information comprising of receiving an audio communication as digital information from a remote source via the Internet and converting the digital information ... in a localized area.” *Office Action* para. 8. In this respect the reference and the claimed subject matter are similar. However, the reference cited differs from the claimed subject matter in the subsequent description. The *Boys* reference teaches broadcasting the information using a cellular system. In a cellular system, whether analog or digital, the user must register with the system and that user is allocated his own personal encoded channel to receive the broadcast information. The subject matter of claim 11, namely the step of “*broadcasting the analog information in a localized area in at least one preselected radio frequency*,” teaches broadcasting and receiving the information, as accessed from the Internet, on a radio frequency. This radio frequency is accessible by anyone with a radio tuner and is not limited to one particular user as the *Boys* system teaches. The

claimed subject matter lowers system overhead and allows for free reception of the broadcast.

This is a fundamental difference which the cited reference does not teach.

Additionally, the Applicants assert that it is not obvious to one skilled in the art at the time of the invention to use radio broadcasting to disseminate information from the Internet. "Virtually all [inventions] are combinations of old elements." *Environmental Designs, Ltd. v. Union Oil Co.*, 713 F.2d 693, 698, 218 U.S.P.Q. (BNA) 865, 870 (Fed. Cir. 1983). "If identification of each claimed element in the prior art were sufficient to negate patentability, very few patents would ever issue." *In re Rouffet*, 149 F.3d 1350, 47 U.S.P.Q.2D (BNA) 1453 (Fed. Cir. 1998). To prevent the use of hindsight based on the invention to defeat patentability of the invention, th[e] court[s] require the examiner to show a motivation to combine the references that create the case of obviousness. In other words, the examiner must show reasons that the skilled artisan, confronted with the same problems as the inventor and with no knowledge of the claimed invention, would select the elements from the cited prior art references for combination in the manner claimed. Id at 1357. Therefore, since the Office Action demonstrates no motivation to use open radio frequency broadcasting for the dissemination of information accessed from the Internet, the Applicants respectfully request that the rejection to claim 11 be withdrawn.

c. Independent claim 17 as amended recites:

17. A method for receiving digital information and transmitting the information in a localized area, comprising the steps of:  
receiving digital information from a remote source via the Internet;  
converting the digital information to analog information;  
*broadcasting the analog information in a localized area in at least one preselected frequency modulated radio frequency.*

(Emphasis added.) Applicant respectfully submits that claim 17 patently defines over the cited prior art for at least the reason that the cited prior art fails to disclose or otherwise teach the features emphasized above.

The Office Action states that "Boys teaches of a system for receiving digital information comprising of receiving an audio communication as digital information from a remote source via the Internet and converting the digital information ... in a localized area." *Office Action* para. 8. In this respect the reference and the claimed subject matter are similar. However, the reference cited differs from the claimed subject matter in the subsequent description. The *Boys* reference teaches broadcasting the information using a cellular system. In a cellular system, whether analog or digital, the user must register with the system and that user is allocated his own personal encoded channel to receive the broadcast information. The subject matter of claim 17, namely the step of "*broadcasting the analog information in a localized area in at least one preselected frequency modulated radio frequency,*" teaches broadcasting and receiving the information, as accessed from the Internet, on a radio frequency. This radio frequency is accessible by anyone with a radio tuner and is not limited to one particular user as the *Boys* system teaches. The claimed subject matter lowers system overhead and allows for free reception of the broadcast. This is a fundamental difference which the cited reference does not teach.

Additionally, the Applicants assert that it is not obvious to one skilled in the art at the time of the invention to use radio broadcasting to disseminate information from the Internet. "Virtually all [inventions] are combinations of old elements." *Environmental Designs, Ltd. v.*

*Union Oil Co.*, 713 F.2d 693, 698, 218 U.S.P.Q. (BNA) 865, 870 (Fed. Cir. 1983). “If identification of each claimed element in the prior art were sufficient to negate patentability, very few patents would ever issue.” *In re Rouffet*, 149 F.3d 1350, 47 U.S.P.Q.2D (BNA) 1453 (Fed. Cir. 1998). To prevent the use of hindsight based on the invention to defeat patentability of the invention, th[e] court[s] require the examiner to show a motivation to combine the references that create the case of obviousness. In other words, the examiner must show reasons that the skilled artisan, confronted with the same problems as the inventor and with no knowledge of the claimed invention, would select the elements from the cited prior art references for combination in the manner claimed. *Id* at 1357. Therefore, since the Office Action demonstrates no motivation to use open radio frequency broadcasting for the dissemination of information accessed from the Internet, the Applicants respectfully assert that the rejection is improper and request that the rejection to claim 17 be withdrawn.

## **2. Claims 4, 9, 10, and 13**

The Office Action rejected claims 4, 9, 10, and 13 under 35 U.S.C. §103(a) as purportedly being unpatentable over Boys (USPN 6,314,094). For at least the reasons set forth below, Applicant respectfully traverses this rejection.

### **a. Claim 4 as amended recites:**

4. The method of claim 1, wherein the step of broadcasting the analog information comprises broadcasting at a power level less than about 100mW.

Because independent claim 1 is believed to be allowable over the prior art of record,

dependent claim 4 is allowable as a matter of law, for at least the reason that dependent claim 4 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 4 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 4 is allowable.

b. Claim 9 as amended recites:

9. The method of claim 1, wherein the step of receiving digital information comprises receiving music as digital information.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 9 is allowable as a matter of law, for at least the reason that dependent claim 9 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 9 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 4 is allowable.

c. Claim 10 as amended recites:

10. The method of claim 1, wherein the step of receiving digital information comprises receiving radio program content as digital information.

Because independent claim 1 is believed to be allowable over the prior art of record,

dependent claim 10 is allowable as a matter of law, for at least the reason that dependent claim 10 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 10 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 10 is allowable.

**d. Claim 13 recites:**

13. The apparatus of claim 11, further comprising means for displaying user readable information.

Because independent claim 11 is believed to be allowable over the prior art of record, dependent claim 13 is allowable as a matter of law, for at least the reason that dependent claim 13 contains all the features/elements/steps of independent claim 11. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claim 13 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 13 is allowable.

**2. Claims 2, 3, 5-8, 12, 16, 18, and 20**

The Office Action rejected claims 2, 3, 5-8, 12, 16, 18, and 20 under 35 U.S.C. §103(a) as allegedly being unpatentable over Boys (USPN 6,314,094), in view of Lowe et al.

(USPN 6,298,218). For the reasons set forth below, Applicant respectfully traverses this rejection.

**a. Claim 2 as amended recites:**

2. The method of claim 1, wherein the step of receiving digital information comprises receiving information through a means selected from the group consisting of digital subscriber line transmission, telephone line transmission, cable transmission, and satellite transmission.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 2 is allowable as a matter of law, for at least the reason that dependent claim 2 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 2 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 2 is allowable.

**b. Claim 3 as amended recites:**

3. The method of claim 1, wherein the step of broadcasting comprises broadcasting in a radio frequency modulated waveband in the ranges of from about 88 MHZ to about 108 MHZ and from about 540 KHz to about 1.6 MHZ.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 3 is allowable as a matter of law, for at least the reason that dependent claim 3 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071

(Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 3 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 3 is allowable.

Notwithstanding this reason, the Applicants assert that it is not obvious to one skilled in the art at the time of the invention to use radio broadcasting to disseminate information from the Internet. "Virtually all [inventions] are combinations of old elements." *Environmental Designs, Ltd. v. Union Oil Co.*, 713 F.2d 693, 698, 218 U.S.P.Q. (BNA) 865, 870 (Fed. Cir. 1983). "If identification of each claimed element in the prior art were sufficient to negate patentability, very few patents would ever issue." *In re Rouffet*, 149 F.3d 1350, 47 U.S.P.Q.2D (BNA) 1453 (Fed. Cir. 1998). To prevent the use of hindsight based on the invention to defeat patentability of the invention, th[e] court[s] require the examiner to show a motivation to combine the references that create the case of obviousness. In other words, the examiner must show reasons that the skilled artisan, confronted with the same problems as the inventor and with no knowledge of the claimed invention, would select the elements from the cited prior art references for combination in the manner claimed. Id at 1357.

In *Lowe*, as cited by the Office Action para. 9, "starting column 7, line 54 and ending column 8, line 19," the FM receiver is just an FM radio function in the system. It is not incorporated into the transmission system of the information taken from the Internet. The claimed subject matter, on the other hand, uses an FM system with the Internet information retrieval system. The Examiner has demonstrated no motivation for combining the FM

transmission system with the Internet information retrieval system. Therefore, since the Office Action demonstrates no motivation to use open radio frequency broadcasting for the dissemination of information accessed from the Internet, the Applicants respectfully request that the rejection to claim 3 be withdrawn.

c. Claim 5 as amended recites:

5. The method of claim 1, wherein the step of broadcasting the analog information is initiated at a predetermined time and in a predetermined frequency.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 5 is allowable as a matter of law, for at least the reason that dependent claim 5 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 5 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 5 is allowable.

e. Claim 6 as amended recites:

6. The method of claim 1, wherein the step of broadcasting comprises broadcasting information in multiple frequencies.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 6 is allowable as a matter of law, for at least the reason that

dependent claim 6 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 6 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 6 is allowable.

e. Claim 7 as amended recites:

7. The method of claim 1, wherein the step of broadcasting comprises broadcasting in a first frequency for a first time period, and broadcasting information in a second frequency for a second time period.

Because independent claim 1 is believed to be allowable over the prior art of record, dependent claim 7 is allowable as a matter of law, for at least the reason that dependent claim 7 contains all the features/elements/steps of independent claim 1. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 1, dependent claim 7 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 7 is allowable.

f. Claim 12 recites:

12. The apparatus of claim 11, further comprising means for programming the means for broadcasting, the means for programming comprising a program for setting a time to activate the means for broadcasting.

Because independent claim 11 is believed to be allowable over the prior art of record, dependent claim 12 is allowable as a matter of law, for at least the reason that dependent claim 12 contains all the features/elements/steps of independent claim 11. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claim 12 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 12 is allowable.

**g. Claim 16 recites:**

16. The apparatus of claim 11 further comprises means for storing received digital information for broadcasting at a later time.

Because independent claim 11 is believed to be allowable over the prior art of record, dependent claim 16 is allowable as a matter of law, for at least the reason that dependent claim 16 contains all the features/elements/steps of independent claim 11. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claim 16 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 16 is allowable.

**h. Claim 18 recites:**

18. The method of claim 17, further comprising the step of storing received digital information before converting the digital information to analog information.

Because independent claim 17 is believed to be allowable over the prior art of record, dependent claim 18 is allowable as a matter of law, for at least the reason that dependent claim 18 contains all the features/elements/steps of independent claim 17. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 17, dependent claim 18 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 18 is allowable.

**3. Claims 14 and 15**

The Office Action rejected claims 14 and 15 under 35 U.S.C. §103(a) as being unpatentable over Boys (USPN 6,314,094), in view of Dao et al. (USPN 5,915,207). For the reasons set forth below, Applicant respectfully traverses this rejection.

**a. Claim 14 recites:**

14. The apparatus of claim 11, wherein at least the means for receiving and means for converting are contained on a PCI card, the card receiving the transmissions from the Internet and converting the transmissions to analog information for broadcasting.

Because independent claim 11 is believed to be allowable over the prior art of record, dependent claim 14 is allowable as a matter of law, for at least the reason that dependent claim 14 contains all the features/elements/steps of independent claim 11. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claim 14 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 14 is allowable.

**b. Claim 15 recites:**

15. The apparatus of claim 11, wherein the means for receiving, means for converting, and means for broadcasting are contained on a PCI card.

Because independent claim 11 is believed to be allowable over the prior art of record, dependent claim 15 is allowable as a matter of law, for at least the reason that dependent claim 15 contains all the features/elements/steps of independent claim 11. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 11, dependent claim 15 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 15 is allowable.

#### **4. Claim 19**

Claim 19 recites:

19. The method of claim 18, further comprising the steps of converting the stored digital information to analog information at a predetermined time; and broadcasting the analog information in a localized area.

As the Office Action made no objection to or rejection of claim 19, the Applicants respectfully request the allowance of claim 19.

Notwithstanding the lack of mention of claim 19 in the Office Action, because independent claim 17 is believed to be allowable over the prior art of record, dependent claim 19 is allowable as a matter of law, for at least the reason that dependent claim 19 contains all the features/elements/steps of independent claim 17. *See In re Fine*, 837 F.2d 1071 (Fed. Cir. 1988). Additionally and notwithstanding the foregoing reasons for allowability of independent claim 17, dependent claim 19 recites further features and/or combinations of features, as are apparent by examination of the claim itself, that are patentably distinct from the prior art of record. Hence, there are other reasons why dependent claim 19 is allowable.

#### **D. Prior Art Made of Record**

The prior art made of record has been considered, but is not believed to affect the patentability of the presently pending claims.

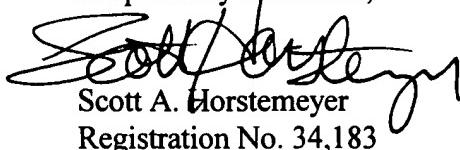
**E. Amendments Made in Response to 35 U.S.C. § 112, Second Paragraph Rejections**

Applicants wish to clarify that the foregoing amendments to claims 1-7 and 9-10 have been made for purposes of better defining the invention in response to the rejections made under 35 U.S.C. § 112, and not in response to the rejections made based on prior art. Indeed, Applicants submit that no substantive limitations have been added to the claims. Therefore, no prosecution history estoppel arises from these amendments. Black & Decker, Inc. v. Hoover Service Center, 886 F.2d 1285, 1294 n. 13 (Fed. Cir. 1989); Andrew Corp. v. Gabriel Electronics, Inc., 847 F.2d 819 (Fed. Cir. 1988); Hi-Life Products Inc. v. American National Water-Mattress Corp., 842 F.2d 323, 325 (Fed. Cir. 1988); Mannesmann Demag Corp. v. Engineered Metal Products Co., Inc., 793 F.2d 1279, 1284-1285 (Fed. Cir. 1986); Moeller v. Ionetics, Inc., 794 F.2d 653 (Fed. Cir. 1986).

**CONCLUSION**

Applicants respectfully submit that all claims are now in proper condition for allowance, and respectfully request that the Examiner pass this case to issuance. If, in the opinion of the Examiner, a telephonic conference would expedite the examination of this matter, the Examiner is invited to call the undersigned attorney at (770) 933-9500.

Respectfully submitted,

  
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**ANNOTATED VERSION OF THE SPECIFICATION AND DRAWINGS,**  
**ILLUSTRATING THE AMENDMENTS MADE THERETO**

**In the Drawings**

The border around the drawings was removed as shown in red ink.

Reference designator 120 was removed as shown in red ink.

**RECEIVED**

**In the Specification**

JUL 15 2002

Technology Center 2600

**Page 1, lines 24-27**

Please amend page 1, lines 24-27 as follows (where underlining denotes additions and brackets denote deletions).

In the field of communication, there is a long standing need to communicate information to particular targeted audiences that have an interest (or potential interest) in the subject matter of the communication. This is important from a commercial standpoint because advertisers are more likely to promote their products and services through a medium that has a high likelihood of reaching their target market. Further, a communications medium that reaches an audience interested in the particular information being communicated is also of interest, regardless of commercial opportunities presented, for purposes of cooperation and exchange of information between persons with common purpose or interest. However, sometimes the target market or audience, although large in aggregate, is thinly spread across the United States, or the world. For example, communications relating to fly fishing may have a relatively large aggregate audience, but

the audience may be thinly scattered throughout the United States and elsewhere, in small communities or even as individuals. While such an audience could conceivably be reached in the United States through a nationally distributed magazine, audio communications, or broadcast from a radio station, the communications would have to be broadcast nationwide to reach all interested persons. Providing such specialized national radio broadcasts directed to potential listeners scattered in small groups throughout the country (or world) may not be economically viable, even though the potential listeners may in aggregate form a large target market or audience. The lack of technology available for low cost nationwide or worldwide audio communication is a significant shortcoming in the "Information Age". There is not at present an audio communications medium that can be broadcasts nationwide or worldwide to reach target markets and audiences with special interests, especially, when the market or audience is thinly spread and not concentrated in one or a few locales.

**Page 2, lines 23-26**

In accordance with the system of the invention, audio information, in the form of a digital communication, is received at a remote receiver via the Internet. Th digital information may include any information that is typically broadcast by radio, such as music and other radio programming. The system converts the digital information to analog information, and broadcasts the analog information in a localized area in at least one preselected radio frequency. The broadcast analog information is received and audio information is communicated to the listener. The receiver is preferably a common frequency modulated (FM) radio, capable of receiving the standard FM

frequencies (in the range of about 88 MHz to about 108 MHz), tuned to the preselected frequency broadcast in the localized area, but could equally well be an amplitude modulated (AM) radio (in the range of about 540kHz to about 1.6MHz), or other type of radio. Thus, the user selects the audio communication (or digital information equivalent) it requires through the Internet, and the information is broadcast to the user's radio in a localized area (such as the user's home) where the user can hear the selected audio communication.